

**RADIATION CONTROL BOARD**

Department of Environmental Quality (Bldg #2),  
Conference Room 101, 168 North 1950 West, Salt Lake City, Utah  
3:00 – 5:00 P.M., March 9, 2010

**TENTATIVE AGENDA**

- I. Minutes (**Board Action Item**)
  - a. Approval of the Minutes from the February 9, 2010 Board Meeting
- II. Rules  
No Items
- III. Radioactive Materials Licensing/Inspection  
No Items
- IV. X-Ray Registration/Inspection  
No Items
- V. Radioactive Waste Disposal (**Board Information Item**)
  - a. Discussion of Stakeholders Responses to the Chairman's Questions About Waste Blending
- VI. Uranium Mill Licensing and Inspection  
No Items
- VII. Other Division Issues (**Board Information Items**)
  - a. Update on Proposed License Condition 35., *EnergySolutions*, UT 2300249
  - b. Monthly Report:
    - i. Moab Mill Tailings Remediation Project
    - ii. Savannah River Depleted Uranium Sampling
    - iii. Division of Radiation Control Activities Report
- VIII. Public Comment
- IX. **The Next Scheduled Board Meeting: April 13, 2010 (Tuesday)**, DEQ Bldg #2, Conference Room 101, 168 North 1950 West, Salt Lake City, Utah 3:00 – 5:00 P.M.

For those individuals needing special assistance in accordance with the Americans with Disabilities Act, please contact Brooke Baker at the Utah Department of Environmental Quality, at 168 North 1950 West, Salt Lake City, UT 84116, Office of Human Resources at (801) 536-4412, TDD (801) 536-4414, or by email at: [bbaker@utah.gov](mailto:bbaker@utah.gov).

<b>1</b>	<p>I. Minutes (Board Action Item)</p> <p>a. Approval of the Minutes from the February 9, 2010 Board Meeting</p>
<b>2</b>	<p>II. Rules</p> <p>No Items</p>
<b>3</b>	<p>III. Radioactive Materials Licensing/ Inspection</p> <p>No Items</p>
<b>4</b>	<p>IV. X-Ray Registration/Inspection</p> <p>No Items</p>
<b>5</b>	<p>V. Radioactive Waste Disposal (Board Information Item)</p> <p>a. Discussion of Stakeholders Responses to the Chairman's Questions About Waste Blending</p>
<b>6</b>	<p>VI. Uranium Mill Licensing and Inspection</p> <p>No Items</p>
<b>7</b>	<p>VII. Other Division Issues (Board Info Items)</p> <p>a. Update on Proposed License Condition 35., EnergySolutions UT 2300249</p> <p>b. Monthly Report:</p> <p>i. Moab Mill Tailings Remediation Project</p> <p>ii. Savannah River Depleted Uranium Sampling</p> <p>iii. <del>Division of Radiation Control Activities</del></p>
<b>8</b>	<p>VIII. Public Comment</p> <p>IX. Other Issues:</p> <p>The Next Scheduled Board Meeting: April 13, 2010 (Tuesday), DEQ Bldg #2, Conference Room 101, 168 North 1950 West, Salt Lake City, Utah, 3:00 – 5:00 P.M.</p>

- I. Minutes (Board Action Item)**
  - a. Approval of the Minutes from the February 9, 2010 Board Meeting**

**MINUTES  
OF  
THE UTAH RADIATION CONTROL BOARD**

**February 9, 2010**

**Department of Environmental Quality, DEQ Building #2**

**Conference Room 101**

**168 N 1950 W**

**Salt Lake City, Utah 84114-4850**

**BOARD MEMBERS PRESENT**

Peter A. Jenkins, M.S., CHP, Chair  
Elizabeth Goryunova, M.S., Vice Chair  
Dane L. Finerfrock, Executive Secretary  
Scott Bird  
Patrick D. Cone  
Frank D. DeRosso, MSPH, CIH  
Christian K. Gardner  
Colleen Johnson  
Edd Johnson  
Douglas S. Kimball, DMD  
Joseph K. Miner, M.D., MSPH  
Amanda Smith, DEQ Executive Director  
John W. Thomson, M.D.  
David A. Tripp, Ph.D.

**BOARD MEMBERS ABSENT/EXCUSED**

-None\_

**DRC STAFF/OTHER DEQ MEMBERS**

**PRESENT**

Kevin Carney, DRC Staff  
Phil Goble, DRC Staff  
John Hultquist, DRC Section Manager  
Boyd Imai, DRC Staff  
Brad Johnson, Deputy Director for DEQ  
Ryan Johnson, DRC Staff  
Craig Jones, DRC Section Manager  
Chris Keyser, DRC Staff  
Laura Lockhart, Attorney, Atty General's Office  
Yoli Necochea, DRC Staff  
Fred Nelson, Attorney, Atty General's Office

**DRC STAFF/OTHER DEQ MEMBERS  
PRESENT- CONTINUE**

Loren Morton, DRC Section Manager  
Sonja Robinson, DRC Staff  
Donna Spangler, PIO, DEQ – PPA Staff

**PUBLIC**

Attachment: Public Attendance List

## **GREETINGS/MEETING CALLED TO ORDER**

Peter A. Jenkins, Chairman, called the board meeting to order at 3:05 p.m. and welcomed the board members and the public. He indicated that if the public wished to address any items on the agenda, they should sign the public, sign-in sheet. Those desiring to comment would be given an opportunity to address their concerns during the comment period.

### **I. APPROVAL OF MINUTES (Board Action Item)**

#### **a. Approval of the Minutes from the January 12, 2010 Board Meeting**

Peter A. Jenkins, Chairman, asked the board members if they had any corrections to the minutes from January 12, 2010. The corrections were requested by the following board members, they were:

Scott Bird requested the following corrections to the minutes:

1. Page 1, correction requested under subtitle: **Board Members Present:** "Scott Bird." Mr. Bird asked that his name be removed from the "Present" list and put on the "Absent" list. Change made to read: **Board Members Absent:** "Scott Bird."
2. Page 3, Item II. a., correction requested to the final vote, which reads: "The Board members voted on this action: **Scott Bird – Yes,**" which changes the final vote that reads: **Vote: 8 Yes; 1 No; and 1 Abstention**" Motion, Carried and Passed." Change to read: **Scott Bird's name was removed from the voting list.** Second correction made on the final vote from the Board which reads: **Vote: 7 Yes; 1 No; and 1 Abstention, Motion, Carried and Passed**"
3. Page 9, Item II. b., top of page, correction requested where it reads: "The Board members voted on this action: **Vote: 9 Yes; and 1 Abstention,**" Motion, Carried and Passed." Corrected to read: **Vote: 8 Yes, 1 Abstention . . .**"

Patrick D. Cone and Amanda Smith requested the following corrections to the minutes on the same item:

4. Page 6, Item II. b., Patrick D. Cone, requested that the spelling of name for the public speaker be corrected, under subtitle which reads: **Public Comments:** **Joe DeCommillo, Attorney for Studwig;** and

Amanda Smith requested a correction to the company name which reads: **Studwig;** Change made to name, title, and company name, to read, under subtitle: **Public Comments:** **Joseph (Joe) DiCamillo, General Counsel for Studsvik;** Correction was also made throughout the paragraph where the company name appears twice and

Correction requested to company name in second paragraph, under

subtitle which reads: Public Comments; and public speaker which reads: "Randy Horiuchi," paragraph which reads: "He had been retained by **Studwig** in the eight years . . ." Change made to read: "**Studs vik** "

Edd Johnson requested the following corrections to the minutes:

5. Page 13, V. b., first and second paragraphs, correction requested to word "**containments**" under subtitle: Questions by the Board:, first sentence which reads: " . . . if DOE indicates when there are **containments** i.e., . . ." and second paragraph which reads: " . . . EnergySolutions, was only aware of the **containments** that were listed . . . ." Both words in the sentences change to read: "**contaminants**"

**MOTION MADE BY DAVID A. TRIPP TO APPROVE THE MINUTES OF JANUARY 12, 2010 WITH THE REQUESTED CORRECTIONS**

**MOTION SECONDED BY SCOTT BIRD**

**MOTION CARRIED AND PASSED UNANIMOUSLY**

## **II. RULES**

### **a. Requirements for Irradiators (R313-34): 5 year agency review (Board Action Item)**

Craig Jones, Section Manager, informed the Board that this action item was in regards to the section of the Utah Administrative Code that addresses the requirements for "irradiators." Mr. Jones said that this had to do with the facilities that are primarily used to sterilize products. He said the sterilized products may be medical devices, medical equipment, spices, and sometimes toys (like those in a McDonalds "Happy Meal)."

Mr. Jones said that the Utah Administrative Act requires state agencies to review each Administrative Rule within five-years of the rule's original effective date or from the last rule review. He said that the Five-Year Notice of Review and Statement of Continuation, for Rule R313-34, was in the board packet. In filing the notice, the Board indicates that the rule is still necessary. Mr. Jones asked the Board, if they had any questions.

### **RECOMMENDATION:**

The Executive Secretary recommended that the Board approve the Five-Year Notice of Review and Statement of Continuation for Rule R313-34, and that the Board direct the Division staff to file the Notice with the Division of Administrative Rules.

### **QUESTIONS BY THE BOARD:**

Edd Johnson asked how many licensees in this category existed in the State of Utah.

Mr. Jones responded that there was one licensee with one panoramic irradiator. It is referred to as "a wet source storage irradiator" because the irradiator is kept in a pool of water.

**MOTION MADE BY EDD JOHNSON THAT THE BOARD APPROVE THE FIVE-YEAR NOTICE OF REVIEW AND STATEMENT OF CONTINUATION FOR RULE R313-34, AND THAT THE BOARD DIRECT THE DIVISION STAFF TO FILE THE NOTICE WITH THE DIVISION OF ADMINISTRATIVE RULES**

**SECONDED BY ELIZABETH GORYUNOVA**

**MOTION CARRIED AND PASSED UNANIMOUSLY**

**b. Requirements for Irradiators (R313-34): Proposed Rule Amendment (Board Action Item)**

Craig Jones informed the Board that during the process to complete a five-year review of Rule R313-34, Requirements for Irradiators, it was noted that the rule incorporated by reference portions of the 2001 Edition of the Code of Federal Regulations. He said it is proposed that the rule be amended to update the incorporated material to the 2010 edition of the Code of Federal Regulations. Mr. Jones asked the Board to refer to their board packet. He asked the board members if they had any questions, the board members had none.

**RECOMMENDATION:**

The Executive Secretary recommended that the Board approve filing the proposed change with the Division of Administrative Rules, and that the Board establish a 30-day period for public comments.

**MOTION MADE BY DAVID A. TRIPP THAT THE BOARD APPROVE FILING THE CHANGE WITH THE DIVISION OF ADMINISTRATIVE RULES, AND THAT THE BOARD ESTABLISH A 30-DAY PERIOD FOR PUBLIC COMMENT**

**SECONDED BY CHRISTIAN K. GARDNER**

**MOTION CARRIED AND PASSED UNANIMOUSLY**

**III. RADIOACTIVE MATERIALS LICENSING/INSPECTION  
No Items**

**IV. X-RAY REGISTRATION/INSPECTION  
No Items**

## V. Radioactive Waste Disposal

### a. **Charles Judd, Cedar Mountain Environmental, Presentation: Plans to Develop a Low-Level Radioactive Waste Disposal Facility, Tooele County (Board Information Item)**

Charles Judd, President of Cedar Mountain Environmental, said that over the past 25 years he had been employed in the radioactive waste industry in Utah. ~~He said, when licensing these types of facilities in the past, the public were kept involved.~~ He said that there was a great need for disposal capacity in the United States; for this reason, he and other folks in the industry decided to "take a shot" at building another waste disposal facility in Utah.

He said that he was aware that it would take a long time for the approval. Mr. Judd said that they were in the very initial phases, and it was not something that was "set in concrete." He felt that it was important for people to know about it. He gave a slide presentation to the Board. Afterward there were not any questions. (See Attached Copy)

### b. **Randy Horiuchi and Joe DiCamillo, Presentation: Technical and Policy Aspects of Downblending (Board Information Item)**

Joe DiCamillo, General Counsel for Studsvik, reported to the Board on this item. Mr. DiCamillo thanked the Board for having him come back and provide them with additional comments on the issue of downblending. He said that due to some miscommunication, he would have to give the Executive Secretary a copy of his presentation after the board meeting.

Mr. DiCamillo said that the reason Studsvik would like to provide information about downblending relates to the fact that they are involved in the industry, and they bring a different industry's perspective to the issue of blending. He said that they are the largest processor of Class B and C resins in the United States and they process a very large quantity of Class A resin. He said Studsvik understands the issues—they understand the technical, regulatory, environmental and safety issues, and they have a different opinion with respect to blending radioactive waste. Mr. DiCamillo said that he wanted to set the record straight: "Studsvik does not engage in downblending."

Mr. DiCamillo discussed the issue of the Board's authority, and the issue of compliance with Utah law. He discussed Studsvik's study regarding health and safety issues that may result from blending Class B and C waste with Class A waste (he said he would provide this document to the Board after the meeting). He went over whether EnergySolutions would be able to safely manage the additional 844 curies--a 700 percent increase in the amount of curies at the Clive site. He said the issues were whether or not from both a performance perspective and from an "environmental impact statement



perspective" EnergySolutions will be able to safely manage the additional curies. He said that he did not have the answer. This is a legitimate question for the Board to ask, and it is a question that needs to be studied and answered.

Mr. DiCamillo said the NRC was discussing the issue of whether or not to amend NRC's guidance with respect to downblending. The NRC was provided with a study. In the study, environmental assessments and performance criteria show that typical blended waste (with cesium-137 being the driver in the waste classification), you have a significant exposure--about 400 times more radioactive exposure to the inadvertent intruder. There are questions that need to be answered with respect to blended waste and its performance assessment, and how it affects the site.

Mr. DiCamillo said that he would also like to talk briefly about what the regulatory status was. He said that he had mentioned that it was guidance. He said that the current guidance at NRC is not designed to address large scale blending by waste processors. The guidance relates to blending at utilities. It is designed to address operational efficiency, and it addresses issues at power plants. The language in NRC's guidance is very clear on that point. He said that the Board could read his letter (which was an attachment in the board packet). He thought the Board would be able to understand the issue clearly. He said his statements about NRC guidance was confirmed by the NRC, and the guidance was read at the last board meeting.

Mr. DiCamillo said from a "compatibility point within your State" it is difficult to understand how the Board could view blended waste outside of the legislative intent. It would be in direct contravention to the letter that was issued at the last meeting. He asked the board members, if they had any questions.

#### **QUESTIONS BY THE BOARD:**

The Board had several questions for Mr. DiCamillo regarding the waste blending of material. They had questions regarding Mr. DiCamillo's explanation of using the term to "co-mingle waste;" questions on the bulk survey relating to "low radioactivity" for the NRC's licensing program; the volumes of radioactivity in the waste; if cesium-137 was the cause of the high volume readings; and whether the drums coming to Studsvik's Facility were classified prior to or after their arrival at the facility. Chairman Jenkins said that he could not understand why it was o.k. to have bulk classifications with certain concentrations--averaging in one case, but not in another. He said this fundamental question remained the same.

Chairman Jenkins said to the board members that they should not rely on the 400 times increase in dose which had been mentioned earlier without any justification—he said that it did not relate specifically to the Clive site.

Chairman Jenkins said that one of questions that the Board was trying to address were health and safety concerns. If the Board took Studsvick's health and safety study at face value, there is a 400 percent increase in dose—that is something the Board needs to consider. In other words, if there is a demonstrated health and safety issue, he had no doubt that the Board would act very quickly and make a decision. He wanted to make certain that Studsvick's study was a "sound technical evaluation." He said that the surface contamination in the study was for a very small area which does not reflect the Clive site.

Discussion followed by the board members as to whether the material coming into the facility was classified prior to or after downblending. Chairman Jenkins said in his opinion some antics are being played with the term downblending. He said that the NRC classifies waste only for disposal. That is the extent of the NRC's classification program. Technically, there is not a regulatory framework for the classification of processing waste—there is only classification for disposal.

Joseph DiCamillo said he agreed with Chairman Jenkins. The utility companies "as a matter of habit" classify the waste. Waste classification was one line on the manifest. There is not a requirement that radioactive waste be classified, until it is ready for disposal.

#### **PUBLIC COMMENTS:**

Tom Magette, EnergySolutions, distributed a hand-out for the board members. He asked them to follow it, while he went over his presentation on downblending.

Mr. Magette went over the primary issues on the slides; the classification of waste; the BTC guidance documents by NRC--which stated that waste streams may not be mixed only to reduce the result for classification; and NRC's guidance--which acknowledged that some downblending may be appropriate (See Attached Copy).

#### **QUESTIONS BY THE BOARD:**

David A. Tripp asked Mr. Magette if he happened to have any information that would familiarize Mr. Tripp with the differences between gamma activity and the half-lives of cesium and iron. He said that he was not familiar with iron-50.

Tom Magette said that he could not cite for Mr. Tripp any specific half-life or radioactive energy. He could tell him that generally the half-life of cesium is going to be significantly longer, about 30 years. It is going to be a driver. The inadvertent intruder may occur after site closure--100 years out. That is why the cesium-137 is so important. If you drive that concentration down by

having other nuclides meet that class limit to force it, you reduce the concentration of cesium-137. That is what will reduce the inadvertent intruder dose.

Bill Dornsife, WCS (Waste Control Specialist Inc.), said that he was the one that did the intruder analysis. Mr. Dornsife said that he was the Executive Vice President for Licensing and Regulatory Affairs for Waste Control Specialist Inc. He said that he had over 40 years of experience with low-level waste issues. He discussed the issues in the intruder scenario. He said that the proposal that Utah was considering was very similar to a rule that already existed in Texas. The difference was that Texas called it dilution just like everybody else does among the regulatory agencies. He said that there were no definitions for downblending in the NRC's rules or anywhere else.

Mr. Dornsife explained his test to the Board, and how he had come to the conclusions of his test in each scenario: "the waste stream and the homestead scenario." He said that it did not matter if cesium was not the dominant radioactive nuclide. There was still going to be a lot of cesium in the waste. He said that at 100 years the analysis showed that the intruder would receive 40-rem, per-year exposure. At 100 years and at 300 years, it was still 500 millirem of dose. Mr. Dornsife said that Utah regulations have a performance objective that requires protection of the intruder. Just meeting the classification system was not enough to show that the waste would meet the performance objective. He said that he thought that "site-specific analysis" needed to be done to show that there were no intruder issues with the waste.

Mr. Dornsife said that Waste Control Specialist Inc. (WCS) did not have a competitive issue, but rather an issue of liability. He said that with the closing of Barnwell, Class B and C waste was stranded waste. He said that if the waste could be imported to WCS (which was important to their viability), WCS would be the only facility in the Compact that would be able to operate a downblending facility among all of the waste facilities that have tried before.

#### **QUESTIONS BY THE BOARD:**

Peter A. Jenkins, Chairman, said that the Intruder Analyst, Bill Dornsife, was very important to the Board. He said that the Board recognized Mr. Dornsife's expertise and that he was certainly more of an expert than some of the opinions they had received at the board meeting. He asked Mr. Dornsife to submit his study to the Executive Secretary, Dane Finerfrock, after the meeting. Chairman Jenkins said that he would also like to receive comments on this study, and that he wanted this study submitted to the entire Board for evaluation (in light of the subcommittee's work that is on going).

Chairman Jenkins said that he would like to enter the study into the record; so, it could be distributed and reviewed by other experts. He said that Mr.

Dornsife had mentioned the rule that the Board was considering, but that the Board was not considering a rule making on blended waste.

Bill Dornsife apologized. He said he thought there was a proposed rule or draft rule.

Chairman Jenkins had several questions for Bill Dornsife, they were: (1) , what effect would *EnergySolutions*' accepting blended waste have on WCS, (2) whether Mr. Dornsife represented the Compact or WCS, (3) what interest did WCF have in a Utah's rule concerning *EnergySolutions* and blended waste.

Bill Dornsife, responded to all of Chairman Jenkins and additional questions the Board had regarding the import of waste to WCS Inc.

Chairman Jenkins said to Mr. Dornsife that he had said that it was matter of "leveling the playing field and economic feasibility," but that this sounded like competition to him.

c. **Report from the Board Subcommittee on Waste Blending and Discussion on Draft Policy Statement on Waste Blending (Board Action Item)**

Patrick D. Cone reported that there were two meetings held by the Subcommittee and during that time they had, had almost the same kind of discussions and similar to what they were hearing today. It was a lot of information and there were a lot more questions than answers. Mr. Cone said that the Subcommittee consisted of: Amanda Smith, Christian K. Gardner, David A. Tripp, and Edd Johnson, Peter A. Jenkins and Patrick D. Cone. At the last meeting they had not had a quorum.

Mr. Cone said that during the meeting of the subcommittee that they had not come to any kind of consensus or opinion on this issue. Mr. Cone said the only recommendation to the Board from the subcommittee was "for a continuance of the meetings."

Chairman Jenkins said that he had proposed, through the subcommittee, a list of six questions that he would like the stakeholders' to address and answer in written form and to add whatever other information they might want to add. He asked them to submit their answers as soon as possible to the Board for consideration by the subcommittee. Chairman Jenkins said that this would be his initial recommendation to Mr. Cone's recommendation.

Chairman Jenkins said that the Board recognizes the support of the subcommittee and asked the subcommittee to come forward with recommendations to the Board at the April 2010 board meeting.

**MOTION MADE BY CHRISTIAN K. GARDNER THAT THE BOARD CONTINUE THE SUB-COMMITTEE'S WORK; AND LOOK AT THE ISSUE OF DOWNBLENDING; AND TO WORK WITH THE DIVISION STAFF AND WITH THE STAKEHOLDERS IN GETTING THE QUESTIONS ANSWERED; AND HAVE A RECOMMENDATION FOR THE BOARD TO REVIEW AT THE APRIL 2010 BOARD MEETING**

**SECONDED BY DOUGLAS S. KIMBALL**

**MOTION CARRIED AND PASSED UNANIMOUSLY**

Chairman Jenkins said that he handed out some questions he would like answered to the board members. He said that he had put some handouts on the table, and invited the members of the public to get a copy and submit their comments to the Executive Secretary within two weeks.

**VI. URANIUM MILL LICENSING AND INSPECTION**  
**No Items**

**VII. OTHER DIVISION ISSUES**

**a. Update on Proposed License Condition 35., EnergySolutions, UT 2300249 (Board Information Items)**

Dane Finerfrock, Executive Secretary, reported on this item to the Board. He said that this item had to do with the comments that the Division had received on License Condition 35, and the Division analyzed those contents. He said that Laura Lockhart and John Hultquist had responded to the comments. He said he had a first draft of the comments, but that they did not have a summarized copy for the Board. He said that under normal course of events that the Division would respond to the comments but the Board had been involved since the beginning of this process; therefore, he needed to know what the Board wanted to do.

Peter A. Jenkins, Chairman, asked Fred Nelson, Attorney, if the license condition, amendment number 35. were appealed to the Board, if it would remain adjudicated.

Fred Nelson explained that because it was a license condition, it should be the Executive Secretary that would make the decision based on the comments. If it were appealed, it would be appealed to the Board.

Mr. Nelson said that his recommendation was that the Board simply advise the Executive Secretary of the process he should go through in making the decision. Mr. Nelson said that based on the Executive Secretary's response to

the comments, if somebody appealed his decision the Board would review it.

**b. Update on the Proposed Depleted Uranium Rule**

**i. Review of the Public Comments**

Fred Nelson continued explaining that although this was not true or the same in the Depleted Uranium (DU) rule, a DU rule was a rulemaking in the legislative process. The Board could be involved however they wished to be on this issue.

Dane Finerfrock said that he had the comments with him that had been received by the Division on the DU rulemaking. Mr. Finerfrock said that there were extensive comments; and once again, he would like to ask the Board what involvement they wanted to have in reading the comments and compiling with and responding to them.

Chairman Jenkins said that those on the subcommittee were discussing the blending issue. There would be a lot of work there; and so, his recommendation would be for those on the subcommittee not to be involved in reviewing the public comments on DU.

Discussion followed by the Board as to who should review the comments. The final recommendation by Chairman Jenkins was that the Executive Secretary have the Division staff scan and distribute the comments electronically and then Board could respond to them, if they wished--otherwise the Executive Secretary could continue the process as he normally would and respond to them.

Chairman Jenkins asked Laura Lockhart, Attorney, if there was a deadline or a timeline. Laura Lockhart responded that they had 120 days after the filing of the rule.

**ii. Laura Lockhart, Administrative Rule Process for Revised Rules**

Laura Lockhart asked the board members to refer to the rulemaking process chart in the Utah Administrative Rule process that she had handed out. Ms. Lockhart explained that the flow chart described the rulemaking process. She said that she had added notations which were specific points which would have to happen to the rule from the Board. Ms. Lockhart explained that the first column was essentially where the Board was currently at right now—the Board was reviewing the comments and determining whether to proceed with the rule.

Ms. Lockhart said that the second column was what the Board would have to consider after they looked at the comments (and that was the

question whether they wanted to proceed with the rule). Ms. Lockhart explained that the Board had 120 days from when the rule was published to either file a "Notice of Effective Date," or to file a "Notice of Proposed Rule Change."

Chairman Jenkins asked the board members to have a response to the DU comments to Dane Finerfrock no later than April 3, 2010.

**c. Quarterly Report**

Peter A. Jenkins, Chairman, asked the Board, if there were any questions on the Division Activities Report. The board members had none.

**Update on Lawsuit Between EnergySolutions Filed Against the Northwest Compact and Intervened by the State of Utah**

Chairman Jenkins said that he would like the Board to get an update from the Attorney General's Office on the oral argument between EnergySolutions and the Northwest Compact, and the intervention by the State of Utah that was before the Court of Appeals.

Fred Nelson explained that this, the lawsuit, was filed between EnergySolutions against the Northwest Compact. The State of Utah intervened and appealed the decision to the Tenth Circuit Court on January 2010. Mr. Nelson reported that the oral argument occurred and that both the State of Utah and Northwest Compact had requested additional time during that argument. He said the additional twenty-five minutes of the oral argument was taken up by questions being asked by the court. Mr. Nelson said that it was obvious that the court had carefully reviewed the briefs and the questions were good.

Mr. Nelson said at the end of the Court's decision, the Court did what they always do, and they said they would defer making a ruling on the matter, until the Court issued a written opinion. Mr. Nelson said that he did not know when that would happen--it could be quick (three or four months), or it could be up take a year. He said that it would depend on how soon they can "get all the issues in there," but the briefing and the argument was done.

**VIII. PUBLIC COMMENT**

Christopher Thomas, HEAL-Utah:

Mr. Thomas said that he wanted to comment on the downblending issue. He said that he was glad the Board was moving forward and that the Board was considering a lot more information. He said that HEAL-Utah was looking forward to responding to the questions that Chairman Jenkins had "put out there to be answered." Mr. Thomas asked if the Board could make the response to the questions available on the website, so that other people could look at them.

**Chairman Jenkins amended his proposal to include that the responses be provided electronically, but asked if someone did not have the means to submit their comments electronically that the Division scan them and then submit them that way.**

Mr. Thomas said that his final comments were about the proposal that was brought up by Mr. Charles Judd on the development of another waste disposal facility (Item V.a.). He said that HEAL-Utah was opposed to the increase of another nuclear waste disposal in the State of Utah, whether it came from EnergySolutions or Cedar Mountain. Mr. Thomas said that it did not matter whether it was going to be a kinder or gentler facility, but that basically enough was enough. Mr. Thomas said as Mr. Judd had noted, a waste dump facility required the approval of the Governor and the legislature. He said that he hoped Governor Herbert would put an immediate end to this now in a written form. He said to what it meant for the State's perspective, it would mean saving thousands of hours in reviewing all of the application materials, and it could be better spent regulating EnergySolutions.

**QUESTIONS BY THE BOARD:**

Peter A. Jenkins, Chairman, asked Mr. Thomas how he felt about the tailings site in Moab and moving them to Crescent Junction.

Christopher Thomas responded that he thought these were different in the sense that, that material was being moved away from a water source. He said if somebody tried to take that site and expanded it to create a commercial nuclear waste site, HEAL-Utah would be opposed to that too.

Edd Johnson said that he was opposed to Utah or the Western State's taking everybody's waste, but that he did not know how to oppose it from a legal standpoint. Mr. Johnson asked Dane Finerfrock, if somebody was to apply to him with a radioactive material license application, whether he could refuse an application just because he didn't like the guy. Mr. Johnson asked Mr. Finerfrock whether he had an obligation to issue the license--so long as that applicant satisfied the requirements.

Dane Finerfrock, Executive Secretary, responded, that he was correct. He said that in the case of the low-level waste facility jurisdiction, there were requirements in the statute that required the Governor's approval and legislator in the statute. Mr. Finerfrock said that he could not deny an application or amendment, even if he did not like the applicant. The same requirements were applicable that had been issued or required from EnergySolutions.

- IX. The Next Scheduled Board Meeting: March 9, 2010 (Tuesday), DEQ Bldg #2, Conference Room 101, 168 North 1950 West, Salt Lake City, Utah 3:00 – 5:00 P.M. THE BOARD MEETING ADJOURNED AT 5:08 P.M.**



- I. Minutes (Board Action Item)**
  - a. Approval of the Minutes from the  
February 9, 2010 Board Meeting**

**Public Attendance List – February 9, 2010**

**Public Attendance Sheet**  
**Utah Radiation Control**  
**Board Meeting**  
 DEQ Bldg. #2, Conf. Room 101  
 168 N 1950 W, Salt Lake City, UT 84114-4850  
 3:00 - 5:00 p.m.  
 February 9, 2010  
*Please Print*

NAME (Please Print)	Organization/Affiliation Phone Number and Email Address:	Speak: Yes or No? If Yes, which Agenda Item would you like to Address, List Item No.:
1. THOMAS MAGETTE	ENERGY SOLUTIONS	Y - V-b
2. Don Shrum	Energy Solutions	Y - V-b
3. <del>Christopher Thomas</del>	HEAL Utah	y <del>✓</del> A/c
4. Vanessa Pierce	HEAL Utah	N
5. Bryana Melchior	Public	N
6. BILL DORNSIFE	WCS	Y - V-b
7. J. LA SWEET	Gamma West	
8. Amy Jennings	Deseret News	NO
9. Mark Ledoux	Energy Solution	NO
10. Scott Kirk	WCS	
11. BOB ARCHIBALD	—	NO
12. Sean McCandless	Energy Solutions	No
13. Mary Ellen Nantz	Public	N
14. BOB ARCHIBALD	"	N
15. Robert Baird	URS Corp	No
16. James Holthaus	Hollist & Hunt	No
17. <sup>(Joe)</sup> Joseph DiCamillo	Studs v. ke	Item Vb. / present: on
18.		
19.		

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NAME (Please Print)	Organization/Affiliation: Phone Number and Email Address:	Speak: Yes or No? If Yes, which Agenda Item would you like to Address, List Item No.:
20. David Esser	DRC	No
21. Randy Hara	studsrik	on agenda
22. Eric Spreng	HEAL Utah	No
23. Jeff Cray	Citizen	No
24. Sig Walke	Sitka	NO
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NAME (Please Print )	Organization/Affiliation Phone Number and Email Address:	Speak: Yes or No? If Yes, which Agenda Item would you like to Address, List Item No.:
39. James O'Neal	private citizen	yes VIII
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- VII. Other Division Issues (Board Information Item)**
  - b. Monthly Report:**
    - i. Moab Mill Tailings Remediation Project**

## Moab Uranium Mill Tailings Clean-up

Contact: Connie S. Nakahara, DEQ,  
801-366-0523

Date: February 23, 2010

### Status

On April 20, 2009, the Department of Energy began shipping tailings from the Moab Uranium Mill site to the Crescent Junction disposal cell. Over 860 tons of tailings have been shipped by rail to the disposal cell.<sup>1</sup> The ability to ship 40 percent of the volume was due to the \$108 million from the American Recovery and Reinvestment Act awarded in March 2009. As a result of the infusion of stimulus funding, two shifts and two train shipments occur each weekday. Approximately 160 additional jobs were provided by the stimulus funding.

DOE is currently pumping contaminated groundwater to an evaporation pond to capture the contaminants (ammonia, uranium). If additional funding can be secured, DOE plans to implement additional groundwater treatment methods. I asked that DEQ be included in the process.

In December 2009, DOE completed construction of the underpass of State Route 279 which connects the mill site with the rail loading facility. Completion of the underpass enables DOE to ship the maximum number of containers per train.

Dr. Pamela S. Perlich, Senior Research Economist, Bureau of Economic and Business Research, University of Utah proposed to conduct an Economic Impact Study of the Moab Uranium Mill Tailings remediation project. It is unclear whether Grand County will authorize Dr. Perlich's proposal.

### Background

The 435-acre Moab Uranium Mill Tailings site is the former Atlas Mineral Corporation uranium facility.<sup>2</sup> The site abuts the west bank of the Colorado River and the southern border of Arches National Park. Years of uranium processing left the groundwater beneath the site contaminated with ammonia, uranium, copper, manganese and sulfate. The 130-acre tailing pile continues to leach ammonia into the aquifer. The contaminated groundwater flows into the Colorado River, thus, the source of contamination - the tailings pile must be moved. In 2005, the State of Utah in concert with the Utah delegation and other Moab tailing stakeholders (Grand County, City of Moab, USGS, L.A. Power and Water, etc.) persuaded the DOE to issue a Record of Decision to move the tailings to Crescent Junction, Utah for disposal in an NRC approved disposal

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<sup>1</sup> Monday through Thursday DOE ships 136 containers to Crescent Junction.

<sup>2</sup> Atlas Minerals Corporation ceased operation in 1984 and declared bankruptcy in 1989. In October 2001, title of the Moab tailings site transferred to DOE as authorized under Public Law 106-398 - the Floyd D. Spence National Defense Authorization Act for FY2001. Public Law 106-398 further mandated that cleanup occur in accordance with the Uranium Mill Tailings Radiation Control Act of 1978 - Public Law 95-604.

cell. Don Metzler is the DOE project manager for the Moab Tailings clean up.

In June 2007, DOE selected EnergySolutions Federal Services, Inc., of Oak Ridge, Tennessee as its remediation contractor.<sup>3</sup> DOE also selected S&K Aerospace Inc.<sup>4</sup> to provide technical and administrative support, including oversight on the design and disposal activities. In addition, S&K is responsible for groundwater monitoring and remediation at the Moab site.

As proposed by Congressman Matheson, PL 110-181, effective January 2008, mandates DOE complete the clean up of the Moab uranium mill tailings by October 1, 2019 instead of the DOE projected completion date of 2028.

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<sup>3</sup> Teamed with EnergySolutions, Jacobs Engineering Group, Inc. will perform engineering design services; Envirocon, Inc. for removal of the tailings pile, and Neilson Construction for infrastructure construction support.

<sup>4</sup> S&K is teamed with Professional Project Services, Inc.

**VII. Other Division Issues (Board Information Item)**

**b. Monthly Report:**

**iii. Division of Radiation Control Activities Report**



Division of Radiation Control  
Activities Report Summary  
February, 2010

Notices of Violation assigned a Severity Level I, II, or III or where a Monetary Penalty has been imposed.

1. Settlement Agreement for Notice of Violation and Order, Denison Mines, Utah Ground Water Discharge Permit No.UGW 370004. A \$4000.00, monetary penalty was imposed for violations of the Ground Water Discharge Permit or Water Quality Rules for failing to use a Bureau of Laboratory Improvement, Utah Dept. of Health, certified laboratory to analyze ground water samples.